Physics Today, Volume IV

JANUARY–DECEMBER, 1951

Abstracting
An Experiment in Standardization, by D. E. Gray, IV:3:*8*
Recent Developments in Physics Abstracting, by D. E. Gray, IV:8:*18*
Accurate Measurement of Time, The, by D. Brouwer, IV:8:*6*
Acoustical Society of America
Acoustical Society of America, history and organization, IV:10:*22*
November 1950 meeting, reported by F. V. Hunt, IV:4:*31*
Acoustics
Acoustics, by H. Fletcher, IV:12:*12*
Flashsounds and Aural Constructs for the Blind, by V. Twersky, IV:3:*10*
Alphabet Soup [mathematical symbols], by M. W. Zemansky, IV:7:*4*
Amaldi, E., communication on physics in Italy, IV:5:*5*
American Association of Physics Teachers
Joint meeting with American Society for Engineering Education, June 1951, reported by B. H. Dickinson, IV:9:*29*
American Association of Physics Teachers, history and organization, IV:10:*26*
American Institute of Physics
Annual report for 1950, by H. A. Barton, IV:5:*18*
American Institute of Physics, history and organization, IV:10:*14*
Letter to NSRB on emergency use of manpower, IV:1:*26*
New style manual, IV:7:*28*
Program of 20th anniversary meeting, October 1951, IV:10:*28*
20th anniversary meeting, October 1951, reported by H. A. Barton, IV:12:*19*
Twenty Years of Age, by G. R. Harrison, IV:10:*12*
The Undergraduate and the American Institute of Physics, by T. H. Osgood, IV:4:*4*
American Physical Society
American Physical Society, history and organization, IV:10:*18*
April 1951 meeting, IV:7:*30*
How to Address the American Physical Society, by K. K. Darrow, IV:2:*4*
American Society for Engineering Education, joint meeting with AAPT, June 1951, reported by B. H. Dickinson, IV:9:*29*
Atomic Energy Commission
Industrial development of nuclear reactors, IV:8:*26*
Dissemination of Technical Information by AEC, by D. E. Gray, IV:11:*22*
Report of advisory committee on declassifying technical information useful to industry discussed, IV:4:*27*
Industrial use of fission products, IV:6:*27*
Auroral physics, July 1951 conference on, reported by A. L. Aden, IV:12:*33*
Australia, Physics in, by L. G. H. Huxley, IV:7:*6*

Barton, H. A., American Institute of Physics letter to NSRB on emergency use of manpower, IV:1:*26*; scientific manpower legislation, IV:3:*27*; Annual AIP Report, IV:5:*18*
Beiser, A., *New Light on the Origin of Cosmic Rays*, IV:7:*14*
Bennett, R. D., *Physicists in the Present Emergency*, IV:1:*4*
Biophysics
How Big is a Cell? by J. G. Hoffman, IV:2:*12*
Books reviewed
Cloud Physics, by D. W. Perrie, reviewed by V. J. Schaefer, IV:7:*26*
Cosmic Radiation and its Biological Effects, by V. F. Hess and J. Eugster, reviewed by C. A. Tobias, IV:3:*25*
Cosmic Rays, by L. Leprince-Ringuet, reviewed by A. M. Thorndike, IV:5:*22*
Counting Tubes, Theory and Application, by S. C. Curran and J. D. Craggs, reviewed by A. Beiser, IV:8:*21*
De Re Metallica, by G. Agricola, reviewed by L. Smoluchowski, IV:6:*22*
Foundations of Aerodynamics, by A. M. Kuethe and J. D. Schetzer, reviewed by J. B. Kelley, IV:7:*25*
Hydrodynamics, by G. Birkhoff, reviewed by R. D. Richtmyer, IV:2:*25*
Ionization Chambers and Counters, by D. H. Wilkinson, reviewed by A. Beiser, IV:8:*21*
Isaac Newton, by E. N. Da C. Andrade, reviewed by I. B. Cohen, IV:11:*20*
Joseph Henry, His Life and Work, by T. Coulson, reviewed by L. Page, IV:2:*25*
Manual of Artificial Radioisotope Therapy, A, by P. F. Hahn, reviewed by M. D. Kamen, IV:9:*27*
Methods of Operations Research, by P. M. Morse and G. E. Kimball, reviewed by P. M. S. Blackett, IV:11:*18*
Molecules in Motion, by T. G. Cowling, reviewed by R. M. Sutton, IV:4:*23*
Nature of Physical Reality, The, A Philosophy of Modern Physics, by H. Margenau, reviewed by P. Frank, IV:1:*24*
Origin of the Earth, The, by W. M. Smart, reviewed by A. Beiser, IV:9:*27*
Perturbation Methods in the Quantum Mechanics of n-Electron Systems, by E. M. Corson, reviewed by I. Kaplan, IV:7:*25*
Physiology of Heat Regulation and the Science of Clothing, by L. H. Newburgh, reviewed by R. B. Finch, IV:4:*24*
Piezoelectric Crystals and Their Applications to Ultrasonics, by W. P. Mason, reviewed by H. Baerwald, IV:5:*23*
Principles of Cloud Chamber Technique, The, by J. G. Wilson, reviewed by S. Neddermeyer, IV:12:*20*
Progress in Biophysics and Biophysical Chemistry, Volume I, edited by J. J. Randall and J. A. V. Butler, reviewed by H. J. Curtis, IV:8:*21*
Radioactive Measurements with Nuclear Emulsions, by H. Yagoda, reviewed by J. G. Hoffman, IV:6:*21*
Sea Around Us, The, by R. L. Carson, IV:8:*22*
Selection of Writings by Augusto Righi, edited by G. C. Dalla Noce and G. Valle, reviewed by S. De Benedetti, IV:4:*24*
Sourcebook on Atomic Energy, by S. Glasstone, IV:4:*23*
Stellar Evolution, by O. Struve, reviewed by C. Payne-Gaposchkin, IV:5:*22*
Supersonic Aerodynamics, A Theoretical Introduction, by E. R. C. Miles, reviewed by J. B. Kelley, IV:7:*25*
Theory of Hearing, by E. G. Wever, reviewed by W. A. Rosenblith, IV:3:*25*
Borst, L. B., *The Brookhaven Nuclear Reactor*, IV:1:*6*
Breckenridge, R. G., *Solid State Electronics*, IV:9:*6*
Brickwedde, F. G., agenda for 1951 SUN commission meeting, International Union of Pure & Applied Physics, IV:3:*33*
Brode, W. R., *Journal Abbreviations*, IV:8:*4*
Brookhaven Nuclear Reactor, The, by L. B. Borst, IV:1:*6*
Brouwer, D., *The Accurate Measurement of Time*, IV:8:*6*
Brown, W. F., Jr., communication on semantics, IV:2:*10*

Canada, physics in
The NRX Pile at Chalk River, by W. B. Lewis, IV:11:*12*
Canadian Association of Physicists, May 1951 meeting, reported by W. Rowles, IV:9:*30*
Carnegie Institute of Technology, Physics at, by L. Smoluchowski, IV:8:*16*
Cosmic Rays, New Light on the Origin of, by A. Beiser, IV:7:*14*
Communication Theory, by J. R. Pierce, IV:5:*6*
Critical tables, communication on from H. S. Joachim and N. Fuson, IV:3:*5*

Darrow, K. K., *How to Address the American Physical Society*, IV:2:*4*; *Physics as a Science and an Art*, IV:11:*6*
DeWitt, B. S., *Theoretical Physics in the Alps*, IV:12:*22*

Education, physics
Alphabet Soup [mathematical symbols], by M. W. Zemansky, IV:7:*4*
College enrollment trends, IV:7:*18*
The Fulbright Program, by D. E. Gray, IV:4:*12*
"Lab", by G. P. Harnwell, IV:12:*4*
Quality of Education in Physics, The, by G. P. Harnwell, IV:5:*4*
Role of Scientific Institutes in American Education, The, by A. W. Lawson, IV:9:*4*
Student exchange program discussed, IV:7:*17*
Theoretical Physics in the Alps, by B. S. DeWitt, IV:12:*22*
Undergraduate and the American Institute of Physics, The, by T. H. Osgood, IV:4:*4*

Physics Today, Volume IV

JANUARY–DECEMBER, 1951

Abstracting
An Experiment in Standardization, by D. E. Gray, IV:3:*8*
Recent Developments in Physics Abstracting, by D. E. Gray, IV:8:*18*
Accurate Measurement of Time, The, by D. Brouwer, IV:8:*6*
Acoustical Society of America
Acoustical Society of America, history and organization, IV:10:*22*
November 1950 meeting, reported by F. V. Hunt, IV:4:*31*
Acoustics
Acoustics, by H. Fletcher, IV:12:*12*
Flashsounds and Aural Constructs for the Blind, by V. Twersky, IV:3:*10*
Alphabet Soup [mathematical symbols], by M. W. Zemansky, IV:7:*4*
Amaldi, E., communication on physics in Italy, IV:5:*5*
American Association of Physics Teachers
Joint meeting with American Society for Engineering Education, June 1951, reported by B. H. Dickinson, IV:9:*29*
American Association of Physics Teachers, history and organization, IV:10:*26*
American Institute of Physics
Annual report for 1950, by H. A. Barton, IV:5:*18*
American Institute of Physics, history and organization, IV:10:*14*
Letter to NSRB on emergency use of manpower, IV:1:*26*
New style manual, IV:7:*28*
Program of 20th anniversary meeting, October 1951, IV:10:*28*
20th anniversary meeting, October 1951, reported by H. A. Barton, IV:12:*19*
Twenty Years of Age, by G. R. Harrison, IV:10:*12*
The Undergraduate and the American Institute of Physics, by T. H. Osgood, IV:4:*4*
American Physical Society
American Physical Society, history and organization, IV:10:*18*
April 1951 meeting, IV:7:*30*
How to Address the American Physical Society, by K. K. Darrow, IV:2:*4*
American Society for Engineering Education, joint meeting with AAPT, June 1951, reported by B. H. Dickinson, IV:9:*29*
Atomic Energy Commission
Industrial development of nuclear reactors, IV:8:*26*
Dissemination of Technical Information by AEC, by D. E. Gray, IV:11:*22*
Report of advisory committee on declassifying technical information useful to industry discussed, IV:4:*27*
Industrial use of fission products, IV:6:*27*
Auroral physics, July 1951 conference on, reported by A. L. Aden, IV:12:*33*
Australia, Physics in, by L. G. H. Huxley, IV:7:*6*

Barton, H. A., American Institute of Physics letter to NSRB on emergency use of manpower, IV:1:*26*; scientific manpower legislation, IV:3:*27*; Annual AIP Report, IV:5:*18*
Beiser, A., *New Light on the Origin of Cosmic Rays*, IV:7:*14*
Bennett, R. D., *Physicists in the Present Emergency*, IV:1:*4*
Biophysics
How Big is a Cell? by J. G. Hoffman, IV:2:*12*
Books reviewed
Cloud Physics, by D. W. Perrie, reviewed by V. J. Schaefer, IV:7:*26*
Cosmic Radiation and its Biological Effects, by V. F. Hess and J. Eugster, reviewed by C. A. Tobias, IV:3:*25*
Cosmic Rays, by L. Leprince-Ringuet, reviewed by A. M. Thorndike, IV:5:*22*
Counting Tubes, Theory and Application, by S. C. Curran and J. D. Craggs, reviewed by A. Beiser, IV:8:*21*
De Re Metallica, by G. Agricola, reviewed by L. Smoluchowski, IV:6:*22*
Foundations of Aerodynamics, by A. M. Kuethe and J. D. Schetzer, reviewed by J. B. Kelley, IV:7:*25*
Hydrodynamics, by G. Birkhoff, reviewed by R. D. Richtmyer, IV:2:*25*
Ionization Chambers and Counters, by D. H. Wilkinson, reviewed by A. Beiser, IV:8:*21*
Isaac Newton, by E. N. Da C. Andrade, reviewed by I. B. Cohen, IV:11:*20*
Joseph Henry, His Life and Work, by T. Coulson, reviewed by L. Page, IV:2:*25*
Manual of Artificial Radioisotope Therapy, A, by P. F. Hahn, reviewed by M. D. Kamen, IV:9:*27*
Methods of Operations Research, by P. M. Morse and G. E. Kimball, reviewed by P. M. S. Blackett, IV:11:*18*
Molecules in Motion, by T. G. Cowling, reviewed by R. M. Sutton, IV:4:*23*
Nature of Physical Reality, The, A Philosophy of Modern Physics, by H. Margenau, reviewed by P. Frank, IV:1:*24*
Origin of the Earth, The, by W. M. Smart, reviewed by A. Beiser, IV:9:*27*
Perturbation Methods in the Quantum Mechanics of n-Electron Systems, by E. M. Corson, reviewed by I. Kaplan, IV:7:*25*
Physiology of Heat Regulation and the Science of Clothing, by L. H. Newburgh, reviewed by R. B. Finch, IV:4:*24*
Piezoelectric Crystals and Their Applications to Ultrasonics, by W. P. Mason, reviewed by H. Baerwald, IV:5:*23*
Principles of Cloud Chamber Technique, The, by J. G. Wilson, reviewed by S. Neddermeyer, IV:12:*20*
Progress in Biophysics and Biophysical Chemistry, Volume I, edited by J. J. Randall and J. A. V. Butler, reviewed by H. J. Curtis, IV:8:*21*
Radioactive Measurements with Nuclear Emulsions, by H. Yagoda, reviewed by J. G. Hoffman, IV:6:*21*
Sea Around Us, The, by R. L. Carson, IV:8:*22*
Selection of Writings by Augusto Righi, edited by G. C. Dalla Noce and G. Valle, reviewed by S. De Benedetti, IV:4:*24*
Sourcebook on Atomic Energy, by S. Glasstone, IV:4:*23*
Stellar Evolution, by O. Struve, reviewed by C. Payne-Gaposchkin, IV:5:*22*
Supersonic Aerodynamics, A Theoretical Introduction, by E. R. C. Miles, reviewed by J. B. Kelley, IV:7:*25*
Theory of Hearing, by E. G. Wever, reviewed by W. A. Rosenblith, IV:3:*25*
Borst, L. B., *The Brookhaven Nuclear Reactor*, IV:1:*6*
Breckenridge, R. G., *Solid State Electronics*, IV:9:*6*
Brickwedde, F. G., agenda for 1951 SUN commission meeting, International Union of Pure & Applied Physics, IV:3:*33*
Brode, W. R., *Journal Abbreviations*, IV:8:*4*
Brookhaven Nuclear Reactor, The, by L. B. Borst, IV:1:*6*
Brouwer, D., *The Accurate Measurement of Time*, IV:8:*6*
Brown, W. F., Jr., communication on semantics, IV:2:*10*

Canada, physics in
The NRX Pile at Chalk River, by W. B. Lewis, IV:11:*12*
Canadian Association of Physicists, May 1951 meeting, reported by W. Rowles, IV:9:*30*
Carnegie Institute of Technology, Physics at, by L. Smoluchowski, IV:8:*16*
Cosmic Rays, New Light on the Origin of, by A. Beiser, IV:7:*14*
Communication Theory, by J. R. Pierce, IV:5:*6*
Critical tables, communication on from H. S. Joachim and N. Fuson, IV:3:*5*

Darrow, K. K., *How to Address the American Physical Society*, IV:2:*4*; *Physics as a Science and an Art*, IV:11:*6*
DeWitt, B. S., *Theoretical Physics in the Alps*, IV:12:*22*

Education, physics
Alphabet Soup [mathematical symbols], by M. W. Zemansky, IV:7:*4*
College enrollment trends, IV:7:*18*
The Fulbright Program, by D. E. Gray, IV:4:*12*
"Lab", by G. P. Harnwell, IV:12:*4*
Quality of Education in Physics, The, by G. P. Harnwell, IV:5:*4*
Role of Scientific Institutes in American Education, The, by A. W. Lawson, IV:9:*4*
Student exchange program discussed, IV:7:*17*
Theoretical Physics in the Alps, by B. S. DeWitt, IV:12:*22*
Undergraduate and the American Institute of Physics, The, by T. H. Osgood, IV:4:*4*

Subject and Author Index

Electromagnetic Waves
Growing Waves, by J. R. Pierce, IV:3:*4*
Electronics
Third annual conference on gaseous electronics, October 1950, reported by J. D. Cobine, IV:3:*32*
Electron Physics, APS Division of, electron emission symposium, January 1951, reported by R. L. Sproull, IV:6:*32*
Engineering and Pure Science, by W. F. G. Swann, IV:6:*9*

Facilities for Research
Ames Laboratory, new research building, IV:11:*27*
Brookhaven National Laboratory, new biology laboratory, IV:12:*32*
University of California School of Medicine synchrotron, IV:11:*27*
Canada, *The NRX Pile at Chalk River*, by W. B. Lewis, IV:11:*12*
Carnegie Tech, Physics at, by L. R. Smoluchowski, IV:8:*16*
University of Chicago synchrocyclotron, IV:6:*26*
University of Chicago research institutes, IV:7:*19*
Corona Laboratories, NBS, established, IV:8:*25*
Cosmic ray observatories, IV:2:*11*; IV:6:*5*; IV:8:*24*; IV:12:*32*
Duke University Van de Graaff generator, IV:6:*26*
James Forrestal Research Center at Princeton, IV:4:*27*
University of Houston magnetic observatory, IV:7:*20*
Lowell Textile Institute Research Foundation established, IV:7:*17*
Michigan University Phoenix Project, IV:1:*29*
MIT hydrodynamics laboratory, IV:8:*24*
National Bureau of Standards mobile ionospheric laboratory unit, IV:9:*25*; 50 Mev betatron, IV:8:*25*
NYU, Physics Research at University Heights, by S. A. Korff, IV:11:*16*
Yale University geochronometric research center, IV:4:*27*; new physics building, IV:12:*31*
Flashsounds and Aural Constructs for the Blind, by V. Twersky, IV:3:*10*
Fletcher, H., *Acoustics*, IV:12:*12*
France, physics in
A Physicist's Holiday, by A. Zucker, IV:1:*12*
Physics in France, by V. Weisskopf, IV:12:*6*
Frequency control, Signal Corps Engineering Laboratories fifth annual symposium on, May 1951, reported by E. W. Johnson, IV:7:*30*
Fulbright Program
The Fulbright Program, by D. E. Gray, IV:4:*12*; IV:4:*26*; IV:8:*27*; IV:9:*23*
Fuson, N. (with H. S. Joachim), communication on critical tables, IV:3:*5*

Geophysics
Formation of West European Geophysical Union, IV:9:*24*
Society of Exploration Geophysicists, joint meeting with American Association of Petroleum Geologists and Society of Economic Paleontologists and Mineralogists, April 1951, IV:7:*32*
Germany, physics in
Library of Congress surveys reported, IV:11:*24*
Gray, D. E., *Library of Congress Science Division*, IV:1:*28*; *Scientific Liaison Offices*, IV:2:*28*; *An Experiment in Standardization*, IV:3:*8*; *The Fulbright Program*, IV:4:*12*; *Science in the State Department*, IV:5:*13*; *An Interview with the Director of the National Science Foundation*, IV:6:*6*; *The NRC Division of International Relations*, IV:7:*22*; *Recent Developments in Physics Abstracting*, IV:8:*18*; *Basic Research in the Office of Naval Research*, IV:9:*17*; *Dissemination of Technical Information by AEC*, IV:11:*22*; *The Office of Technical Services of the Department of Commerce*, IV:12:*24*
Guggenheim awards in physics for 1951, IV:6:*26*

Harnwell, G. P., *"Lab"*, IV:12:*4*; *The Quality of Education in Physics*, IV:5:*4*
Harrison, G. R., the American Institute of Physics, *Twenty Years of Age*, IV:10:*12*; *Testimony on Manpower*, IV:3:*6*
High frequency measurements, second conference on, January 1951, IV:6:*31*
High Polymer Physics, APS Division of
November 1950 meeting, reported by W. L. Davidson, IV:3:*31*; April 1951 meeting, reported by J. B. Nichols, IV:8:*30*

Hoffman, J. G., *How Big is a Cell?* IV:2:*12*
Houston, W. V., *On the Spirit of Physics*, IV:2:*9*
How Big is a Cell? by J. G. Hoffman, IV:2:*12*
How to Address the American Physical Society, by K. K. Darrow, IV:2:*4*
Huxley, L. G. H., *Physics in Australia*, IV:7:*6*

Infrared spectroscopy
Formation of National Research Council Committee on Infrared Absorption Spectra, IV:11:*26*
Communication on, from D. E. Olshevsky, IV:6:*5*
Experimental Infrared Spectroscopy, by J. Strong, IV:4:*14*
International scientific unions
Agenda for SUN commission meeting, IUPAP, July 1951, discussed by F. G. Brickwedde, IV:3:*33*
International Council of Scientific Unions, third annual meeting, October 1951, IV:12:*37*
International Union of Pure and Applied Physics, 7th assembly in Copenhagen, July 1951, reported by J. A. Wheeler, IV:11:*30*
Institute of Radio Engineers
March 1951 convention, IV:7:*31*
Professional group on antennas and propagation, joint meeting with URSI U. S. National Committee, April 1951, IV:9:*31*
Italy, physics in
A Physicist's Holiday, by A. Zucker, IV:1:*12*
Communication on, from E. Amaldi, IV:5:*5*
India, physics in
New cosmic ray observatory at Gulmarg, IV:12:*32*

Japan, physics in
Science Council of Japan, IV:10:*45*
Journal Abbreviations, by W. R. Brode, IV:8:*4*
Joachim, H. S. (with N. Fuson), communication on critical tables, IV:3:*5*

Kelley, J. B., *Plasticity*, IV:3:*17*
Klopsteg, P. E., heads NSF division, IV:12:*28*
Korff, S. A., communication on cosmic ray observatories, IV:6:*5*; IV:2:*11*; *Physics Research at University Heights, NYU*, IV:11:*16*

Lawson, A. W., *The Role of Scientific Institutes in American Education*, IV:9:*4*
Lewis, W. B., *The NRX Pile at Chalk River*, IV:11:*12*
Library of Congress Science Division, by D. E. Gray, IV:1:*28*
Low-Temperature physics, March 1951 symposium on, IV:8:*31*

Macurdy, L. B., *Standards of Mass*, IV:4:*7*
Manpower, scientific
American Institute of Physics letter to NSRB on emergency use of, IV:1:*26*
Defense Department Plan reported, IV:2:*30*
Legislation on, by H. A. Barton, IV:3:*27*
Physicists in the Present Emergency, by R. D. Bennett, IV:1:*4*
Report of NSRB advisory committee discussed, IV:3:*28*
Science and Mobilization, statement by the Science Advisory Committee of the Office of Defense Mobilization, IV:11:*4*
Scientific Readiness, by A. T. Waterman, IV:11:*3*
Shortage of, discussed, IV:12:*29*
The Stockpiling and Rationing of Scientific Manpower, by H. D. Smyth, IV:2:*18*
Studies in human resources, IV:5:*25*
Testimony on Manpower, by G. R. Harrison, IV:3:*6*
Meetings
Acoustical Society of America November 1950 meeting, reported by F. V. Hunt, IV:4:*31*
American Association of Physics Teachers, joint meeting with American Society for Engineering Education, June 1951, reported by B. H. Dickinson, IV:9:*29*
American Institute of Physics, program of 20th anniversary meeting, October 1951, IV:10:*28*; 20th anniversary meeting, October 1951, reported by H. A. Barton, IV:12:*19*

American Physical Society April 1951 meeting, IV:7:*30*
Canadian Association of Physicists May 1951 meeting, reported by W. Rowles, IV:9:*30*
Conference on Auroral Physics, July 1951, reported by A. L. Aden, IV:12:*33*
Electron emission symposium (APS Division of Electron Physics), January 1951, reported by R. L. Sproull, IV:6:*32*
Exploration Geophysicists, Society of, joint meeting with American Association of Petroleum Geologists and Society of Economic Paleontologists and Mineralogists, April 1951, IV:7:*32*
Frequency control symposium, fifth annual, May 1951, reported by E. W. Johnson, IV:7:*30*
Gaseous electronics, third annual conference on, October 1950, reported by J. D. Cobine, IV:3:*32*
High frequency measurements, second conference on, January 1951, IV:6:*31*
High Polymer Physics, APS Division of, April 1951 meeting, reported by J. B. Nichols, IV:8:*30*; November 1950 meeting, reported by W. L. Davidson, IV:3:*31*
Institute of Radio Engineers March 1951 convention, IV:7:*31*
International Council of Scientific Unions, third annual meeting, October 1951, IV:12:*37*
International Union of Pure and Applied Physics, 7th assembly in Copenhagen, July 1951, reported by J. A. Wheeler, IV:11:*30*
Lattice Imperfections, October 1950 Pocono Conference on, reported by R. Smoluchowski, IV:2:*35*
Low-Temperature physics, March 1951 symposium, IV:8:*31*
Motion Picture and Television Engineers, Society of, April 1951 convention, IV:7:*32*
National Academy of Sciences, April 1951 meeting, IV:7:*30*
Nuclear Physics, September 1950 conference on, reported by C. Mark, IV:3:*31*
Optical Society of America March 1951 meeting, reported by S. S. Ballard, IV:5:*31*
Photographic Research and Development Conference, May 1951, reported by B. Marcus, IV:8:*32*
Physical Society of Pittsburgh November 1951 meeting, IV:12:*38*
Rheology, Society of, November 1950 meeting reported by E. K. Fischer and R. S. Marvin, IV:2:*34*; December 1950 meeting reported by G. J. Dienes, IV:4:*31*
Sigma Pi Sigma, fifth national convention, December 1950, reported by M. W. White, IV:2:*35*
SUN Commission, IUPAP, agenda for July 1951 meeting discussed by F. G. Brickwedde, IV:3:*33*
Unesco, sixth general conference, June 1951, IV:9:*21*
Union Radio Scientifique Internationale (U. S. National Committee) and Institute of Radio Engineers professional group on antennas and propagation, April 1951 meeting, IV:9:*31*
X-ray and electron diffraction, 8th annual Pittsburgh conference on, November 1950, reported by L. E. Alexander and H. P. Klug, IV:1:*32*
Motion Picture and Television Engineers, Society of, April 1951 convention, IV:7:*32*

National Research Council
The NRC Division of International Relations, by D. E. Gray, IV:7:*22*
Formation of committee on infrared absorption spectra, IV:11:*26*
Committee report on operations research, IV:9:*12*
National Academy of Sciences, April 1951 meeting, IV:7:*30*
National Science Foundation, IV:4:*26*; IV:6:*6*; IV:9:*23*; IV:10:*44*; IV:12:*28*
Nobel prize in physics, 1950, award to C. F. Powell, IV:2:*30*
Nuclear data for low-power research reactors, IV:9:*22*
Nuclear physics, conference on, at Oxford, September 1950, reported by C. Mark, IV:3:*31*
Nuclear reactors
The Brookhaven Nuclear Reactor, by L. B. Borst, IV:1:*6*
The NRX Pile at Chalk River, by W. B. Lewis, IV:11:*12*

Obituaries
Ball, J. A., IV:10:*46*; Bjerknes, V. F. K., IV:8:*28*; Bohr, H. A., IV:4:*29*; Cheng Yang, Hsu, IV:5:*29*; Duff, A. W., IV:6:*29*; Eyring, C. F., IV:3:*30*; Fischer, E. K., IV:10:*46*; Gardner, E., IV:1:*30*; Harkins, W. D., IV:5:*29*; Hettinger, E. L., IV:11:*28*; Hornbeck, J. W., IV:5:*29*; Jones, A. T., IV:4:*29*; Kinsey, W. H., IV:10:*46*; Loofbourow, J. R., IV:3:*30*; Montgomery, C. G., IV:3:*30*; Nagai, T., IV:6:*29*; Nishina, Y., IV:4:*29*; Roseberry, H. H., IV:12:*32*; Snoddy, L. B., IV:1:*30*; Sommerfeld, A., IV:7:*21*; Taft, R. B., IV:6:*29*; Thompson, J. S., IV:9:*25*; Vavilov, S., IV:4:*29*; Zeleny, J., IV:8:*28*
Office of Naval Research, Basic Research in the, by D. E. Gray, IV:9:*17*
Office of Technical Services of the Department of Commerce, The, by Dwight E. Gray, IV:12:*24*
Olshevsky, D. E., communication on infrared spectroscopy, IV:6:*5*
Operations Research with Special Reference to Nonmilitary Research, statement by Committee on Operations Research of the National Research Council, IV:9:*12*
Optical Society of America
history and organization, IV:10:*20*
March 1951 meeting, reported by S. S. Ballard, IV:5:*31*
Osgood, T. H., *The Undergraduate and the American Institute of Physics*, IV:4:*4*

Photography
Photographic Research and Development Conference, May 1951, reported by B. Marcus, IV:8:*32*
Society of Motion Picture and Television Engineers, April 1951 convention, IV:7:*32*
Physical Society of Pittsburgh, November 1951 meeting, IV:12:*37*
Physicist's Holiday, A, by A. Zucker, IV:1:*12*
Physicists in the Present Emergency, by R. D. Bennett, IV:1:*4*
Physics and Natural Philosophy, by J. R. Van Wazer, IV:6:*18*
Physics as a Science and an Art, by K. K. Darrow, IV:11:*6*
Physical Standards
NBS Mercury-198 lamps reported, IV:6:*25*
Standards for Electrical Measurement, by F. B. Silsbee, IV:1:*19*
Standards of Mass, by L. B. Macurdy, IV:4:*7*
Pierce, J. R., *Communication Theory*, IV:5:*6*; *Growing Waves*, IV:3:*4*
Plasticity, by J. B. Kelley, IV:3:*17*
Powell, C. F., winner of 1950 Nobel prize in physics, IV:2:*30*

Quantum Physics
Thinking in Quantum Terms, by L. I. Schiff, IV:6:*4*

Radioisotopes
Commercial production of, IV:11:*26*
Enlargement of AEC export program, IV:9:*20*
Enrichment of samarium, IV:1:*30*
New distribution centers in northeast, IV:4:*28*
Radio-electronics, Institute of Radio Engineers March 1951 convention, IV:7:*31*
Rheology, Society of
November 1950 meeting, reported by E. K. Fischer and R. S. Marvin, IV:2:*34*
West coast meeting December 1950, reported by G. J. Dienes, IV:4:*31*
The Society of Rheology, history and organization, IV:10:*24*

Schiff, L. I., *Thinking in Quantum Terms*, IV:6:*4*
Science Advisory Committee, members appointed, IV:6:*24*
Scientific Institutes in American Education, The Role of, by A. W. Lawson, IV:9:*4*
Scientific Liaison Offices, by D. E. Gray, IV:2:*28*
Semantics, communication on, from W. F. Brown, Jr., IV:2:*10*
Sigma Pi Sigma
Fifth national convention, December 1950, reported by M. W. White, IV:2:*35*
Joins AIP, IV:5:*26*
New chapters installed, IV:9:*24*
Silsbee, F. B., *Standards for Electrical Measurement*, IV:1:*19*
Smoluchowski, L. R., *Physics at Carnegie Tech*, IV:8:*16*
Smyth, H. D., *The Stockpiling and Rationing of Scientific Manpower*, IV:2:*18*
Solid State Electronics, by R. G. Breckenridge, IV:9:*6*
Solid state physics
Plasticity, by J. B. Kelley, IV:3:*17*
Pocono conference on lattice imperfections, October 1950, reported by R. Smoluchowski, IV:2:*35*
Spirit of Physics, On the, by W. V. Houston, IV:2:*9*
Standards for Electrical Measurement, by F. B. Silsbee, IV:1:*19*
Standards of Mass, by L. B. Macurdy, IV:4:*7*
State Department, Science in the, by D. E. Gray, IV:5:*13*
Staub, H. H. (with H. Wäffler), *Physics in Switzerland*, IV:5:*16*
Stockpiling and Rationing of Scientific Manpower, The, by H. D. Smyth, IV:2:*18*
Strong, J., *Experimental Infrared Spectroscopy*, IV:4:*14*
Swann, W. F. G., *Engineering and Pure Science*, IV:6:*9*
Switzerland, Physics in, by H. H. Staub and H. Wäffler, IV:5:*16*

Theoretical Physics in the Alps, by B. S. DeWitt, IV:12:*22*
Time Measurement
The Accurate Measurement of Time, by D. Brouwer, IV:8:*6*
Twersky, V., *Flashsounds and Aural Constructs for the Blind*, IV:3:*10*

Unesco, IV:3:*29*; IV:3:*30*; IV:4:*26*; IV:6:*24*; IV:9:*21*
Union Radio Scientifique Internationale (U. S. National Committee), joint meeting with IRE professional group on antennas and propagation, April 1951, IV:9:*31*

Van Wazer, J. R., *Physics and Natural Philosophy*, IV:6:*18*

Wäffler, H. (with H. H. Staub), *Physics in Switzerland*, IV:5:*16*
Waterman, A. T., *Scientific Readiness*, IV:11:*3*
Weisskopf, V., *Physics in France*, IV:12:*6*

X-ray and electron diffraction, 8th annual Pittsburgh conference on, November 1950, reported by L. E. Alexander and H. P. Klug, IV:1:*32*

Zemansky, M. W., *Alphabet Soup*, IV:7:*4*
Zucker, A., *A Physicist's Holiday*, IV:1:*12*